designed for subcarrier operation without mechanical or electrical alterations to the exciter or other transmitter circuits.

- (4) The addition of TV broadcast stereophonic generators to a notified TV broadcast transmitter or the addition of FM broadcast stereophonic generators to a notified FM broadcast transmitter, provided the transmitter exciter is designed for stereophonic sound operation without mechanical or electrical alterations to the exciter or other transmitter circuits.
- (5) The addition of subscription TV encoding equipment for which the FCC has granted advance approval under the provisions of §2.1400 in subpart M and §73.644(c) of part 73 of this chapter to a notified transmitter.
- (d) Notwithstanding the provisions of this section, broadcast licensees or permittees are permitted to modify notified transmitters pursuant to §73.1690 of the FCC's Rules.

[48 FR 3621, Jan. 26, 1983, as amended at 49 FR 3996, Feb. 1, 1984; 49 FR 8252, Mar. 6, 1984; 49 FR 27147, July 2, 1984; 51 FR 2706, Jan. 21, 1986; 51 FR 41628, Nov. 18, 1986]

§ 2.979 Information required on identification label for notified equipment.

Each equipment for which a notification application is filed shall bear an identification plate or label pursuant to §§ 2.925 and 2.926. The FCC Identifier for such equipment will be validated by the grant of notification.

TYPE ACCEPTANCE

§2.981 Cross reference.

- (a) The general provisions of this subpart, §2.901 *et seq.*, shall apply to applications for and grants of type acceptance.
 - (b) [Reserved]

§2.983 Application for type acceptance.

An application for type acceptance shall be filed on FCC Form 731 by the party whose name will be placed on the equipment and shall include the following information either in answer to the questions on the form or as attachments thereto.

- (a) Name of applicant indicating whether the applicant is the manufacturer of the equipment, a vendor other than the manufacturer (include the name of manufacturer), a licensee or a prospective licensee.
- (b) Identification of equipment for which type acceptance is sought.
- (c) Information whether quantity (more than one) production is planned.
- (d) Technical description of the equipment sufficiently complete to develop all the factors concerning compliance with the technical standards of the applicable rule part(s). The description shall include the following items:
 - (1) Type or types of emission.
 - (2) Frequency range.
- (3) Range of operating power values or specific operating power levels, and description of any means provided for variation of operating power.
- (4) Maximum power rating as defined in the applicable part(s) of the rules.
- (5) The dc voltages applied to and dc currents into the several elements of the final radio frequency amplifying device for normal operation over the power range.
- (6) Function of each electron tube or semiconductor or other active circuit device.
 - (7) Complete circuit diagrams.
- (8) Instruction book(s). If the instruction book is not available when the application is filed, a set of draft instructions should be provided and the complete instruction book should be submitted as soon as available. The Commission may specify a date when the complete instruction book should be submitted to conform this requirement with the regulations of the service under which type acceptance is requested.
- (9) Tune-up procedure over the power range, or at specific operating power levels.
- (10) A description of all circuitry and devices provided for determining and stabilizing frequency.
- (11) A description of any circuits or devices employed for suppression of spurious radiation, for limiting modulation, and for limiting power.
- (12) For equipment employing digital modulation techniques, a detailed description of the modulation system to

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be used, including the response characteristics (frequency, phase and amplitude) of any filters provided, and a description of the modulating wavetrain, shall be submitted for the maximum rated conditions under which the equipment will be operated.

- (e) The data required by §§2.985 through 2.997, inclusive, measured in accordance with the procedures set out in §2.999
- (f) A photograph or drawing of the equipment identification plate or label showing the information to be placed thereon.
- (g) Photographs ($8'' \times 10''$) of the equipment of sufficient clarity to reveal equipment construction and layout, including meters, if any, and labels for controls and meters and sufficient views of the internal construction to define component placement and chassis assembly. Insofar as these requirements are met by photographs or drawings contained in instruction manuals supplied with the type acceptance request, additional photographs are necessary only to complete the required showing.
- (h) An encoder device used for the generation of the EBS Attention Signal as defined in §73.906 need not comply with paragraphs (d)(1) through (d)(5) inclusive, (d)(9) through (d)(12) inclusive and paragraph (e) of this section. In lieu of these requirements measurements must be submitted showing compliance with §73.940.
- (i) The application for type acceptance of an external radio frequency power amplifier under part 97 of this chapter need not be accompanied by the data required by paragraph (e) of this section. In lieu thereof, measurements shall be submitted to show compliance with the technical specifications in subpart C of part 97 of this chapter and such information as required by §2.1005 of this part.
- (j) An application for type acceptance of an AM broadcast stereophonic exciter-generator intended for interfacing with existing type-accepted or notified transmitters must include measurements made on a complete stereophonic transmitter. The instruction book required under paragraph (d)(8) of this section must include complete specifications and circuit requirements

for interconnecting with existing transmitters. The instruction book must also provide a full description of the equipment and measurement procedures to monitor modulation and to verify that the combination of stereo exciter-generator and transmitter meet the emission limitations of § 73.44. (Secs. 4, 303, 307, 48 Stat., as amended, 1066, 1082, 1083; 47 U.S.C. 154, 303, 307)

[39 FR 5919, Feb. 15, 1974, as amended at 39 FR 27802, Aug. 1, 1974; 39 FR 35664, Oct. 3, 1974; 40 FR 34117, Aug. 14, 1975; 41 FR 19948, May 14, 1976; 43 FR 12687, Mar. 27, 1978; 52 FR 15725, Apr. 30, 1987]

§2.985 Measurements required: RF power output.

- (a) For transmitters other than single sideband, independent sideband and controlled carrier radiotelephone, power output shall be measured at the RF output terminals when the transmitter is adjusted in accordance with the tune-up procedure to give the values of current and voltage on the circuit elements specified in §2.983(d)(5). The electrical characteristics of the radio frequency load attached to the output terminals when this test is made shall be stated.
- (b) For single sideband, independent sideband, and single channel, controlled carrier radiotelephone transmitters the procedure specified in paragraph (a) of this section shall be employed and, in addition, the transmitter shall be modulated during the test as follows. In all tests, the input level of the modulating signal shall be such as to develop rated peak envelope power or carrier power, as appropriate, for the transmitter.
- (1) Single sideband transmitters in the A3A or A3J emission modes—by two tones at frequencies of 400 Hz and 1800 Hz (for 3.0 kHz authorized bandwidth), or 500 Hz and 2100 Hz (3.5 kHz authorized bandwidth), or 500 Hz and 2400 Hz (for 4.0 kHz authorized bandwidth), applied simultaneously, the input levels of the tones so adjusted that the two principal frequency components of the radio frequency signal produced are equal in magnitude.
- (2) Single sideband transmitters in the A3H emission mode—by one tone at a frequency of 1500 Hz (for 3.0 kHz authorized bandwidth), or 1700 Hz (for 3.5 kHz authorized bandwidth), or 1900 Hz